

FIG. 1

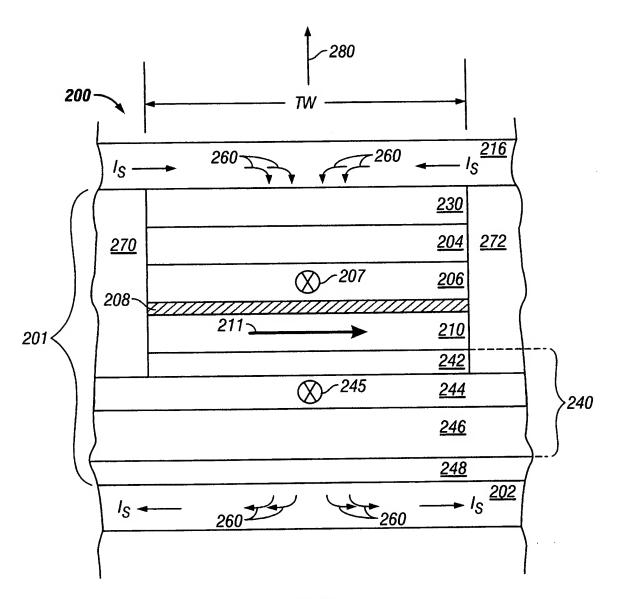
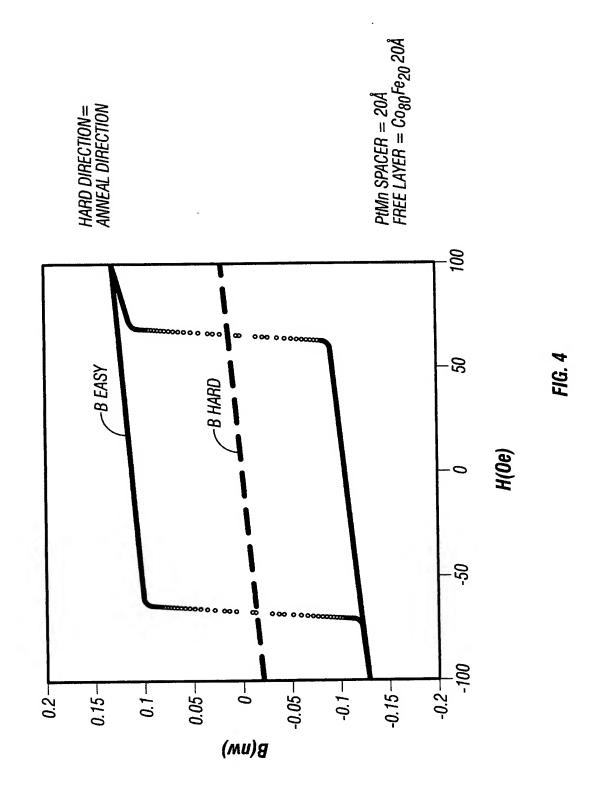


FIG. 2

| Capping Layer  |
|--|
| 20Å Co <sub>80</sub> Fe <sub>20</sub> or 40Å Ni <sub>80</sub> Fe <sub>20</sub><br>Free Layer |
| Pt Mn Spacer Layer   |
| 20Å Co <sub>80</sub> Fe <sub>20</sub> Biasing Layer  |
| Pt Mn or IrMn<br>Antiferromagnet   |
| Underlayer   |
| Si or Glass  |

FIG. 3



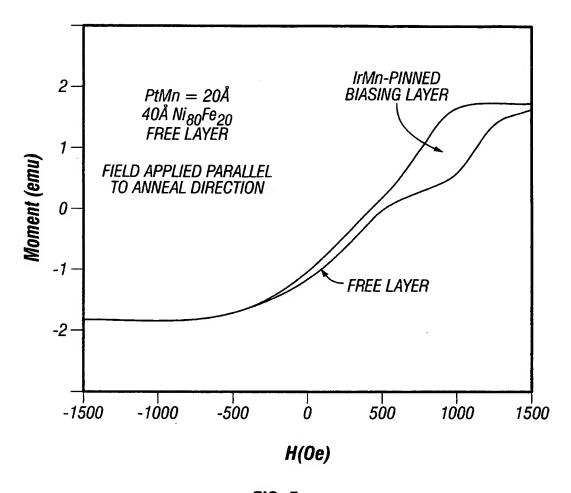


FIG. 5

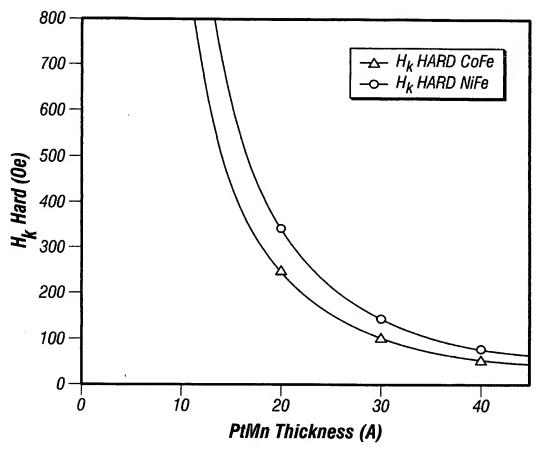


FIG. 6